

RAW SEQUENCE LISTING

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Application Serial Number: 10/S35, S23
Source: PCT
Date Processed by STIC: 5-27-05

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PCT

RAW SEQUENCE LISTING

DATE: 05/27/2005

PATENT APPLICATION: US/10/535,523

TIME: 10:49:53

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Output Set: N:\CRF4\05272005\J535523.raw

3 <110> APPLICANT: The Government of the United States of America

5 <120> TITLE OF INVENTION: CELL LINES AND HOST NUCLEIC ACIDS RELATED TO INFECTIOUS DISEASES

7 <130> FILE REFERENCE: 6395-66741-06

C--> 9 <140> CURRENT APPLICATION NUMBER: US/10/535,523

C--> 9 <141> CURRENT FILING DATE: 2005-05-17

9 <150> PRIOR APPLICATION NUMBER: PCT/03/037143

10 <151> PRIOR FILING DATE: 2003-11-18

12 <150> PRIOR APPLICATION NUMBER: US 60/482,604

13 <151> PRIOR FILING DATE: 2003-06-25

15 <150> PRIOR APPLICATION NUMBER: US 60/427,464

16 <151> PRIOR FILING DATE: 2002-11-18

18 <160> NUMBER OF SEQ ID NOS: 845

20 <170> SOFTWARE: PatentIn version 3.2

22 <210> SEQ ID NO: 1

23 <211> LENGTH: 937

24 <212> TYPE: DNA

25 <213> ORGANISM: Homo sapiens

28 <220> FEATURE:

29 <221> NAME/KEY: misc_feature

30 <222> LOCATION: (1)..(937)

31 <223> OTHER INFORMATION: n is a, g, c, or t

33 <400> SEQUENCE: 1

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 38 agacctaggg gagcatctca gcgtcactcg ctgtccagtt gctgtgatca ggtgctttgg 180
 40 ggtttgtgtg actccagaat ccaactgggcc tgtgtgtcag aagacaaaag ttaaccataa 240
 42 ggcacagaag aaagcctcct gctgaagcca tcgttgcccc acatgcattt cagggacaag 300
 44 aaatgaagat cggagacttt caagttgtgc ccaggactca cctgctccca ggagacaaaa 360
 46 ggccacacag cagaggagcc tgaagcccat ggcaggatct cctagcttgg ggctggtgtc 420
 48 tctgtagtaa gcattctgaa gttcctaagc tcccttcttc ctgataggag cattgacctg 480
 50 tgatgtcacc aactgacat actttcccct gcaggccact ccagcccact gtactctttg 540
 52 gcaggcctca ggttctgcta ctccatgtac tattcctgtc ttgcacaggc cagaagctaa 600
 54 aggtgaggag gactgaacac agtaccaaca taccacatc acaccttact ttcctctgcc 660
 56 cgccctgtcc ctgccctgac actgattccc cagcccttgc caccaccagcc ccttcaccct 720
 58 ccactgcccg tgcagcagca gagacactcc ctcccttgatg caaactgagg cctctggcac 780
 60 cccaactctt tcaaggcaat gatagtctgt gcttaactct acatggccag gccccactc 840
 62 aggggaattnc tgtgtgaaat tggtatccgc tgsacaattc cacacaacat ggnncgtcag 900
 64 accccgaaga aaagaancaa nggatctttt ggnnacc 937

CP5.6-7

67 <210> SEQ ID NO: 2

68 <211> LENGTH: 1515

69 <212> TYPE: DNA

70 <213> ORGANISM: Homo sapiens

73 <220> FEATURE:

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74 <221> NAME/KEY: misc_feature

75 <222> LOCATION: (1)..(1515)

76 <223> OTHER INFORMATION: n is a, c, g, or t

78 <400> SEQUENCE: 2

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83 tatgcagtgc tgccataacc atgagtgata acactgcggc caacttactt ctgacaacga      180
85 tcggaggacc gaaggagcta accgcttttt tgcacaacat gggggatcat gtaactcgcc      240
87 ttgatcgttg ggaaccggag ctgaatgaag ccataccaaa cgacgagcgt gacaccacga      300
89 tgcctgcagc aatggcaaca acgttgcgca aactattaac tggcgaacta cttactctag      360
91 cttcccgcca acaattaata gactggatgg aggcggataa agttgcagga ccacttctgc      420
93 gctcgccctt tccggctggc tggtttattg ctgataaatc tggagccggg gagcgtgggt      480
95 ctcgcgggat cattgcagca ctggggccag atggtaagcc ctcccgatc gtagttatct      540
97 acacgacggg gagtcaggca actatggatg aacgaaatag acagatcgct gagatagggtg      600
99 cctcactgat taagcattng gkaanctgtc agaccattkt ttactgcata tacsgatcca      660
101 ttgcccttat ctcaaaactct tattatgaaa tcactnccct tgagagaraa aaagcctttt      720
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105 agcaatgans cctagtagta ggaaaatcty tatggatagy ggkgnctgak gggaaratc      840
107 ttcytctcat gaarwgatgg kgactggggc tytgggatgc tcacgggaat ccctatttcc      900
109 cccacaaaga agttatttta ttacacaacc atttggatga cccctttttt cttccaattn      960
111 nccaaataaa tctgtaaagg tcacaggtga agttcttctc tttaagagct actccatgct      1020
113 aagttcagcg agaacttggg gtaccctaga cattcttcca gagatgcttt tcttgtaact      1080
115 cttttcaata agtaagcatg ctttgctctg cactgggtgt cacctgtgtt ggatgctgtt      1140
117 gtccctgcct tgcctatat tctgtccaca tggtttcttc ataggatgat gcttaggtca      1200
119 gccctgaggt ttgaaccagt caacaagtcc aggttgggtg ggagtcctt tagtacctcc      1260
121 ctttgagga ataatgctgc acccagaaac tccctcagag cctctccact gggagggggcc      1320
123 ttgtgaccat tctgtgttta ctctcttgt tccagcatcc catgtggcca atggggccct      1380
125 ttcattttca atggtatctc anttnttaca gtaagttata ttattgccct acatngaact      1440
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129 anaatccact tcgnn                                     1515

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132 <210> SEQ ID NO: 3

133 <211> LENGTH: 885

134 <212> TYPE: DNA

135 <213> ORGANISM: Homo sapiens

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139 <221> NAME/KEY: misc_feature

140 <222> LOCATION: (1)..(885)

141 <223> OTHER INFORMATION: n is a, g, c, or t

143 <400> SEQUENCE: 3

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148 ttgcaaggca tggaaaaata cataactgag aatagaaaag ttcagatcga ggtcaggaac      180
150 agatggaaca gggtcgaccg gtcgaccggt cgaccctaga gaaccatcag atgtttccag      240
152 ggtgccccaa ggacctgaaa tgaccctgtg ccttatttga actaaccaat cagttcgctt      300
154 ctcgcttctg ttcgcgcgct tctgtctccc gagctcaata aaagagccca caaccctca      360
156 ctcggggcgc cagtcctccg attgactgag tcgcccgggt acccgtgtat ccaataaacc      420
158 ctcttgagc tgcatccgac ttgtggtctc gctgttcctt gggaggggtc cctctgagtg      480
160 attgactacc cgtcagcggg ggtctttcac tctctgtgta ctggtaccaa cagagcctgg      540
162 accagggcct ccagttcctc attcagtatt ataatggaga agagagagca aaaggaaaca      600

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164 ttcttgaacg attctccgca caacagttcc ctgacttgca ctctgaacta aacctgagct 660
166 ctctggagct gggggactca gctttgtatt tctgtgccag cagcgtaggt ggtagcttga 720
168 aacagttctt cgggccaggg acacggctca ccgtgctagg taagaagggg gctccagtgg 780
170 gagagagggt gagcagccca ncctgnncga ccccanancc tgttnttagg ggagtggnc 840
172 ctgggcatcc aggccctnct cnaggaancg ggttnccgcn ggncc 885
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176 <211> LENGTH: 900
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178 <213> ORGANISM: Homo sapiens
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182 <221> NAME/KEY: misc_feature
183 <222> LOCATION: (1)..(900)
184 <223> OTHER INFORMATION: n is a, g, c, or t
186 <400> SEQUENCE: 4
187 ttggttaactg tcagaccaag tttactcata tcggatccag ttggagccat aagtcgtcag 60
189 acatagaaaa aaatctgaaa agatatctca aaagcccaga catttattca cactaacggt 120
191 gaaaagcata cccacacagtg tcagtggagg caacatgggg tcctggattt cctcttcacc 180
193 ctcaagtggta gtgaggtgtt cctctcactc cttctgagta gaggaagcca agaggaaagc 240
195 tggaaacttgt accatcatcc agtggtgata aagcctctgt ccctccacct tacccccagg 300
197 ttatcagtgg caaccacatg gctagtggta cccctccgc tcctagccag aatgatatca 360
199 gcagaggcct agagagtagc ccaaaaaactc atctgcaccc agcaggactg aggtttccta 420
201 cccccaccaa tggaaagcaa gtgaggaacc taagccttca cctctcactc agcaggaacc 480
203 agacaacacc ccctaacaca cacacacaca cacacacaca cacacccttc tgtagtggtg 540
205 gtatcaagga ggcttgataa aatagaagat ttaaataagga tccattgcc ttatctcaaa 600
207 ctcttattat gaaatcactc ccttgagaga gaaaaaagcc tttttctctt ggattgtccc 660
209 agcagctccc gaccatcccc actccccaac cttatgtggc cccagcaatg agcctagtag 720
W--> 211 taggaaaatc tctatggata ctggtgctga tgggaagatt ctccctctca ngaagtgat 780
213 gtgactgggg ctctgggatg ctacagggaa tnccatttcc cccacaagaa nttattttat 840
215 naccaaccat ttggatgacc cctttttntt ccatttncca annaatttgt aaggncaag 900
218 <210> SEQ ID NO: 5
219 <211> LENGTH: 869
220 <212> TYPE: DNA
221 <213> ORGANISM: Homo sapiens
224 <220> FEATURE:
225 <221> NAME/KEY: misc_feature
226 <222> LOCATION: (1)..(869)
227 <223> OTHER INFORMATION: n is a, g, c, or t
229 <400> SEQUENCE: 5
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234 ctactccatg ctaagttcag cgagaacttg ggtacccta gacattcttc cagagatgct 180
236 tttcttgtaa ctcttttcaa taagtaagca tgctttgctc tgcactgggt gtcacctgtg 240
238 ttggatgctg ttgtccctgc cttgccctat attctgtcca catggtttct tcataggatg 300
240 atgcttaggt cagccctgag gtttgaacca gtcaacaagt ccaggttggg gtggagtccc 360
242 tttagtacct ccctttgcag gaataatgct gcaccagaa actccctcag agcctctcca 420
244 ctggaggggc cttgtgacca ttcctggttt actcctcttg ttccagcatc ccatgtggcc 480
246 aatgggcccc tttcattttc aatggtatct caattcttac agtaagttat attattgccc 540
248 tacatcgaac tcattttttc tcagtgttac ctgaggaaga atggagagga tgcccagaat 600
250 tggcccagaa gaatccactt cgattctaga gaaaaaggca ggtagaggca gaagagattc 660

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252 acttcccagt gcatgctgc tgaatgttg ggggtgtgtt tgagagagac aaggaaatgg 720
254 ctgtaaaact tgggaagagg aacctgccct ggggtcaagta ggggtgtggg aggaccagat 780
256 ggagcttgaa gctctctcca tctttgtcaa gtcccttgga ctgagagggn aaaatnacat 840
258 ggcctttatc ctccagagga aantnatte 869
261 <210> SEQ ID NO: 6
262 <211> LENGTH: 850
263 <212> TYPE: DNA
264 <213> ORGANISM: Homo sapiens
267 <220> FEATURE:
268 <221> NAME/KEY: misc_feature
269 <222> LOCATION: (1)..(850)
270 <223> OTHER INFORMATION: n is a, g, c, or t
272 <400> SEQUENCE: 6
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275 gagttcttct gacgaggact ctgggggttcg aaatgagcta gcccttaagt aacgccattt 120
277 tgcaaggcat ggaaaaatac ataactgaga atagaaaagt tcagatcgag gtcaggaaca 180
279 gatggaacag ggtcgaccgg tcgaccggtc gaccctagag aaccatcaga tgtttccagg 240
281 gtgccccaa gacctgaaat gaccctgtgc cttatttgaa ctaaccaatc agttcgcttc 300
283 tcgcttctgt tcgcgcgctt ctgctccccg agctcaataa aagagccac aaccctcac 360
285 tcggggcgcc agtctctcga ttgactgagt cgcccggtta cccgtgtatc caataaaccc 420
287 tcttgagatt gcatccgact tgtggtctcg ctgttccttg ggagggtctc ctctgagtga 480
289 ttgactaccc gtcagcgggg gtctttcact ctctgtgtac tggtagcaac agagcctgga 540
291 ccagggcctc cagtctctca ttcagtatta taatggagaa gagagagcaa aaggaaacat 600
293 tcttgaacga ttctccgcac aacagttccc tgacttgac tctgaactaa acctgagctc 660
295 tctggagctg ggggactcag ctttgtattt ctgtgccagc agcgtagggt gtagcttgaa 720
297 acagttcttc gggccaggga cacggctcac cgtgctaggt aagaaggggg ctccaggtgg 780
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301 actgggncat 850
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307 <213> ORGANISM: Homo sapiens
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312 <222> LOCATION: (1)..(847)
313 <223> OTHER INFORMATION: n is a, g, c, or t
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320 actccagaat cactggggcc tgtgtgtcag aagacaaaag ttaaccataa ggcacagaag 180
322 aaagcctcct gctgaagcca tcgttgggcc acatgcattt cagggacaag aaatgaagat 240
324 cggagacttt caagttgtgc ccaggactca cctgctccca ggagacaaaa ggccacacag 300
326 cagaggagcc tgaagcccat ggcaggatct cctagcttgg ggctggtgtc tctgtagtaa 360
328 gcattctgaa gttcctaagc tcccttcttc ctgataggag cattgacctg tgatgtcacc 420
330 aactgacat actttccctt gcaggccact ccagccact gtactctttg gcaggcctca 480
332 ggttctgcta ctccatgtac tattctgtc ttgcacaggc cagaagctaa aggtgaggag 540
334 gactgaacac agtaccaaca taccacatc acaccttact ttctctgcc cgccctgtcc 600
336 ctgccctgac actgattccc cagcccttgc caccacagcc ccttcaccct cactgcccc 660
338 tgcagcagca gagacactcc ctccttgatg caaactgagg cctctggcac ccaactctt 720

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340 tcagggcaat gatagtctgt gcttaactct acatggccag gcccactca gggaattctc 780
W--> 342 acctagaatt tcatatncag ccaactaag cttcataagt gaaggggaaa taaaatgctt 840
344 tacagac 847
347 <210> SEQ ID NO: 8
348 <211> LENGTH: 755
349 <212> TYPE: DNA
350 <213> ORGANISM: Homo sapiens
353 <220> FEATURE:
354 <221> NAME/KEY: misc_feature
355 <222> LOCATION: (1)..(755)
356 <223> OTHER INFORMATION: n is a, g, c, or t
358 <400> SEQUENCE: 8
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361 taagtgaag tttattttta tttttttttt ttttttgaga cagagtctcg ctctgtcacc 120
363 caggctagag tgcagtggca tgatcttggc tcaactgaac ctccacctcc caggttcaag 180
365 tgattctctt gcctcagcct cccaagtagc tagtattaca gacgcctgcc accacgcccg 240
367 gttaattttt gtacttttag tagagacagg tttcaccata ttggccaggc tggctctcaa 300
369 ctctgacact caggtgatcc tcctgcctca gcctcccaa gtgctgggat tacaggcatg 360
371 agctaccacg tctggcctaa gtgcatgtta cctatactaa caaaaccaca cttctgcctc 420
373 gaatgagaac agtctcctga acatcttgcc tctttgcctg actcaaagcc tcaggtctaa 480
375 gcctcccat aatttctagt ctccagcaga agatcaatga caggagactc tccaggtgat 540
377 gaaattaacc aattaagtaa cctgggttgg catcctccc tttgttcacc agctcacctn 600
379 ctgccacagg tatatccttt ctctcancca tatatgcaca aaccccctnc ccacggnaca 660
381 catannaana atttgaaga ctanaaaatc aggcanggtg tancncacct tgnnggctgg 720
383 agtatggnan cctgggcccg nacatncata cattg 755
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387 <211> LENGTH: 839
388 <212> TYPE: DNA
389 <213> ORGANISM: Homo sapiens
392 <220> FEATURE:
393 <221> NAME/KEY: misc_feature
394 <222> LOCATION: (1)..(839)
395 <223> OTHER INFORMATION: n is a, g, c, or t
397 <400> SEQUENCE: 9
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400 accttacta caaggatatt acaacaggac attttttaaa acctcaaaca tcaccaaata 120
402 ttctaagtgc aagtttattt ttattttttt tttttttttt gagacagagt ctcgctctgt 180
404 caccaggtc agagtgcagt ggcattgatc tggctcactg caacctccac ctcccagggt 240
406 caagtgatc tcttgacctc gcctcccaa tagctagat tacagacgcc tgccaccacg 300
408 cccggttaat ttttgactt ttagtagaga caggtttcac catattggcc aggctggtct 360
410 caaactcctg acctcaggtg atcctcctgc ctccagcctc caaagtgctg ggattacagg 420
412 catgagctac cagctctggc ctaagtgcac gttacctata ctaacaaaac cacacttctg 480
414 cctcgaatga gaacagctc ctgaacatct tgcctctttg cctgactcaa agcctcaggt 540
416 ctaagcctcc ccataatttc tagtctcagc agaaagatca atgacaggag actctccagg 600
418 tgatgaaatt aaccaattaa gtaacctggg ttggcatcct cccgtttgtt caccagctca 660
420 cctcctgcc caggtatatc ctttctctca gccatatatg cacaaacccc ctccccacgg 720
422 cacacataga aanaatttgg aagactagaa aatcaggcna gggnttanca caccttngag 780
424 ggctggagta tggnanccng ggnccgggan atncatncnn tngaaaactt gactatggg 839
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RAW SEQUENCE LISTING ERROR SUMMARY

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Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

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Seq#:4; N Pos. 771,812,831,841,868,877,882,883,895
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Seq#:23; N Pos. 1548,1550,1558,1560
Seq#:24; N Pos. 498,503,506,652,655,656,658,794,821,834,858,1335,1368,1375
Seq#:24; N Pos. 1402,1435,1437
Seq#:25; N Pos. 8,9,15,32,680,683,700,732,736,745,754,763,764,774,787,797
Seq#:25; N Pos. 800,805,809,814,815,816,819,830
Seq#:26; N Pos. 5,740,744,746,770,778,784,785,795,802,820,827,839,842,845
Seq#:26; N Pos. 852,854
Seq#:27; N Pos. 6,7,234,235,236,797,807,822,830,839,845,864,870,873
Seq#:28; N Pos. 3,9,13,16,17,18,19,20,21,24,27,30,31,32,33,34,39,43,47,49
Seq#:28; N Pos. 50,51,54,56,57,798,806,820,833,853,855,864,865,878,880,884

RAW SEQUENCE LISTING ERROR SUMMARY
PATENT APPLICATION: US/10/535,523

DATE: 05/27/2005
TIME: 10:49:54

Input Set : A:\seq_listing.app
Output Set: N:\CRF4\05272005\J535523.raw

Seq#:28; N Pos. 885,891,894,900,901
Seq#:29; N Pos. 2,8,9,18,23,26,35,41,50,809,813,826
Seq#:30; N Pos. 2,3,4,14,18,19,20,27,28,29,31,32,34,38,41,48,49,50,65,72,85
Seq#:30; N Pos. 90,99,771,782,789,822,827,848,858,862,872,873,879,881,884
Seq#:30; N Pos. 885,888,889
Seq#:31; N Pos. 12,21,574,604,688,691,713,715
Seq#:32; N Pos. 6,250

Invalid <213> Response:

Use of "Artificial" only as "<213> Organism" response is incomplete,
per 1.823(b) of New Sequence Rules. Valid response is Artificial Sequence.

Seq#:238,239,240,241

VERIFICATION SUMMARY

DATE: 05/27/2005

PATENT APPLICATION: US/10/535,523

TIME: 10:49:54

Input Set : A:\seq_listing.app

Output Set: N:\CRF4\05272005\J535523.raw

L:9 M:270 C: Current Application Number differs, Replaced Current Application No
L:9 M:271 C: Current Filing Date differs, Replaced Current Filing Date
L:34 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 after pos.:0
M:341 Repeated in SeqNo=1
L:79 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:2 after pos.:0
M:341 Repeated in SeqNo=2
L:144 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:3 after pos.:0
M:341 Repeated in SeqNo=3
L:211 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:4 after pos.:720
M:341 Repeated in SeqNo=4
L:230 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:0
M:341 Repeated in SeqNo=5
L:299 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:6 after pos.:780
M:341 Repeated in SeqNo=6
L:342 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:7 after pos.:780
L:359 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8 after pos.:0
M:341 Repeated in SeqNo=8
L:398 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9 after pos.:0
M:341 Repeated in SeqNo=9
L:439 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10 after pos.:0
M:341 Repeated in SeqNo=10
L:480 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:11 after pos.:0
M:341 Repeated in SeqNo=11
L:517 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:12 after pos.:0
M:341 Repeated in SeqNo=12
L:556 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:13 after pos.:0
M:341 Repeated in SeqNo=13
L:595 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:14 after pos.:0
M:341 Repeated in SeqNo=14
L:636 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:15 after pos.:0
M:341 Repeated in SeqNo=15
L:677 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:16 after pos.:0
M:341 Repeated in SeqNo=16
L:716 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:17 after pos.:0
M:341 Repeated in SeqNo=17
L:757 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:18 after pos.:0
M:341 Repeated in SeqNo=18
L:796 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:19 after pos.:0
M:341 Repeated in SeqNo=19
L:835 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:20 after pos.:0
M:341 Repeated in SeqNo=20
L:880 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:21 after pos.:0
M:341 Repeated in SeqNo=21
L:947 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:22 after pos.:0
M:341 Repeated in SeqNo=22
L:990 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:23 after pos.:0
M:341 Repeated in SeqNo=23
L:1073 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:24 after pos.:480

VERIFICATION SUMMARY

DATE: 05/27/2005

PATENT APPLICATION: US/10/535,523

TIME: 10:49:54

Input Set : A:\seq listing.app

Output Set: N:\CRF4\05272005\J535523.raw

M:341 Repeated in SeqNo=24

L:1120 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:25 after pos.:0

M:341 Repeated in SeqNo=25

L:1161 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:26 after pos.:0